

AMENDMENTS TO THE CLAIMS

The following listing of the claims replaces all prior versions and listings of the claims in relation to the present patent application.

Listing of the Claims

1. (currently amended) A latch mechanism for a removable component of an electronic device, comprising:

a retention latch;

a leveraging release member; and

a multi-stage actuator comprising:

a first actuator member having a generally linear path of travel to move the retention latch between engaged and disengaged positions with respect to the removable component; and

a second actuator member having a generally linear path of travel to move the leveraging release member to eject the removable component;

wherein the first actuator member is linearly movable independent of the second actuator member;

and wherein the second actuator member is actuated by actuation of the first actuator member.

2. (original) The latch mechanism of claim 1, wherein the retention latch comprises a catch member disposed adjacent a flexible member adapted to facilitate movement of the catch member between secured and released positions.

3. (original) The latch mechanism of claim 1, wherein the first actuator member and the retention latch are wedgingly engageable along at least one angled surface.

4. (original) The latch mechanism of claim 3, wherein the at least one angled surface is disposed on the retention latch.

5. (currently amended) The latch mechanism of claim 3, wherein the at least one angled surface is disposed on the first actuator member.

6. (original) The latch mechanism of claim 1, wherein the leveraging release member comprises a pivot joint and an abutment surface offset from the pivot joint, wherein the second actuator member is movable against the abutment surface in the second position.

7. (currently amended) The latch mechanism of claim 1, wherein the first and second actuator members are configured to travel in the same general direction.

8. (original) The latch mechanism of claim 1, wherein one of the first and second actuator members is disposed movably within the other of the first and second actuator members.

9. (original) The latch mechanism of claim 1, wherein the first actuator member comprises a first button and the second actuator member comprises a second button.

10. (original) The latch mechanism of claim 1, wherein the first actuator member comprises an externally accessible engagement portion adapted for user engagement outside the electronic device.

11. (original) The latch mechanism of claim 10, wherein the second actuator member comprises another externally accessible engagement portion adapted for user engagement outside the electronic device.

12. (previously presented) A computer drive, comprising:
a drive chassis;

a latch movable between released and secured positions against the drive chassis;
a lever movable between unleveraged and leveraged positions against the drive chassis;
a first actuator configured to engage with the latch to move the latch from the secured position to the released position; and
a second actuator configured to engage with the lever after the latch has been moved to the released position to move the lever from the unleveraged position to the leveraged position.

13. (original) The computer drive of claim 12, wherein the drive chassis comprises a rewritable storage device.

14. (original) The computer drive of claim 13, wherein the rewritable storage device comprises a hard disk drive.

15. (original) The computer drive of claim 13, wherein the rewritable storage device comprises a floppy disk drive.

16. (original) The computer drive of claim 12, wherein the drive chassis comprises an optical storage drive.

17. (original) The computer drive of claim 12, wherein the latch comprises a catch member disposed adjacent a forcibly-flexible member.

18. (original) The computer drive of claim 12, wherein the first actuator and the latch are wedgingly engageable along an angled surface.

19. (original) The computer drive of claim 12, wherein the lever comprises a pivot joint and an abutment surface offset from the pivot joint, wherein the second actuator is movable against the abutment surface.

20. (original) The computer drive of claim 12, wherein the first and second actuators are movable one after another along a substantially linear path.

21. (original) The computer drive of claim 12, wherein one of the first and second actuators is disposed movably within the other of the first and second actuators.

22. (original) The computer drive of claim 12, wherein at least one of the first and second actuators comprises an externally accessible engagement portion.

23. (currently amended) A computer chassis, comprising:
a support structure having a receptacle adapted to receive a removable component;
a component retention latch adapted to latch the removable component removably within the receptacle;
a component release lever adapted to leverage the removable component out of the receptacle;
a first actuator movable in a first linear path adapted to unlatch the component retention latch from the removable component; and
a second actuator movable in a second linear path adapted to bias the lever against the removable component to eject the removable component with respect to the chassis;
wherein the first actuator is movable in the first linear path without movement of the second actuator; and
wherein the second actuator member is configured to be actuated to move the component release lever in response to actuation of the first actuator to effect said movement of the component retention latch.

24. (original) The computer chassis of claim 23, wherein the support structure comprises a computer.

25. (original) The computer chassis of claim 23, wherein the component retention latch comprises a catch member disposed against a flexible member adapted to bend and to position the catch member between secured and unsecured configurations with the removable component.

26. (original) The computer chassis of claim 23, wherein the first actuator and the component retention latch are wedgingly engageable along an angled surface to bias the component retention latch.

27. (original) The computer chassis of claim 23, wherein the component release lever comprises a pivot joint and an abutment surface offset from the pivot joint, wherein the second actuator is movable against the abutment surface during the second path.

28. (original) The computer chassis of claim 23, wherein the first and second paths are substantially aligned with one another.

29. (original) The computer chassis of claim 23, wherein one of the first and second actuators is disposed movably within the other of the first and second actuators.

30. (original) The computer chassis of claim 23, wherein at least one of the first and second actuators comprises an externally accessible engagement portion extending outside the support structure.

31. (original) The computer chassis of claim 30, wherein the externally accessible engagement portion comprises a button.

32. (currently amended) A method of operating a mechanism for releasably mounting a drive within a computer chassis, comprising:
positioning a first actuator for release of a drive retention latch in a first position;
and

disposing a second actuator for actuation to engage ~~engagement of~~ a drive release lever in a second position beyond the first position, wherein the second actuator engages the drive release lever after release of the drive retention latch and wherein the second actuator is configured to be actuated in response to actuation of the first actuator to release the drive retention latch.

33. (original) The method of claim 32, comprising aligning the first and second actuators along a single path of motion.

34. (original) The method of claim 32, comprising movably inserting one of the first and second actuators within the other of the first and second actuators.

35. (original) The method of claim 32, comprising biasing a flexible member to move a catch member of the drive retention latch.

36. (original) The method of claim 35, wherein biasing comprises orienting portions of the first actuator and the flexible member to interface wedgingly along an angled surface.

37. (original) The method of claim 32, comprising orienting portions of the second actuator and the drive release lever to abut at an offset from a pivot joint of the drive release lever.

38. (original) The method of claim 32, comprising orienting depressible portions of the first and second actuator members at an external location of the chassis.

39. (currently amended) A method of manufacturing a mechanism for releasably mounting a drive within a computer chassis, comprising:

providing a latch movable between released and secured positions with the drive;
providing a lever movable between unleveraged and leveraged positions against the drive;

providing a first actuator configured when actuated to engage with the latch to move the latch from the secured position to the released position; and

providing a second actuator configured when actuated to engage with the lever after the latch has been moved to the released position to move the lever from the unleveraged position to the leveraged position;

and wherein the second actuator is configured to be actuated in response to actuation of the first actuator.

40. (original) The method of claim 39, wherein providing the latch comprises forming the latch on a flexible member that is bendable between the released and secured positions.

41. (original) The method of claim 40, comprising forming a wedging interface between the flexible member and the first actuator.

42. (original) The method of claim 39, comprising forming an abutment interface between the lever and the second actuator.

43. (original) The method of claim 39, comprising movably coupling one of the first and second actuators within a portion of the other of the first and second actuators.

44. (original) The method of claim 39, comprising movably mounting the first and second actuators for engagement of both the first and second actuators with a single motion.

45. (previously presented) The computer drive of claim 12, wherein actuation of the first actuator to transition the latch from the secured position to the released position releases the drive chassis with respect to a support structure, and wherein actuation of the second actuator to transition the lever from the unleveraged position to the leveraged position ejects the drive chassis with respect to the support structure.

46. (previously presented) The computer chassis of claim 23, wherein actuation of the second actuator in the second linear path ejects the removable component with respect to the support structure.